# Proposal to the Washington State Higher Education Coordinating Board for the Doctor of Nursing Degree Program

## NEW DEGREE PROGRAM PROPOSAL

# **Program Information**

Program Name: Doctor of Nursing Practice

Institution Name: University of Washington

Degree Granting Unit: UW Graduate School and School of Nursing

Degree: Doctor of Nursing Practice

Level: Doctor Type: (of) Nursing Practice

CIP Code: 51.1601

Proposed Start Date: Autumn 2007

Projected Enrollment (FTE) in Year One: 30 At Full Enrollment by Year: 6: 270

(# FTE) (# FTE)

Proposed Reallocated Funding: \_\_\$768,560\_\_

Funding Source: Reallocated Nursing Funding

Mode of Delivery / Locations:

Combination of single campus/traditional classroom, videotape, internet/web

Flexible Scheduling

X Evening Classes

- Weekend Classes
- \_ Other (describe)

**Attendance Options** 

X Full-Time

Part-Time

Total Credits: 95 quarter credits

Contact Information (Academic Department Representative)

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# HECB Proposal July 15, 2005

### I. PROGRAM NEED

### IA. RELATIONSHIP TO INSTITUTIONAL ROLE AND MISSION

The primary mission of the University of Washington (UW) is the preservation, advancement, and dissemination of knowledge. Excellence in nursing education, research, and practice, as well as a commitment to service, are the hallmarks of the UW School of Nursing (SoN). The School has been rated the #1 School of Nursing in the U.S. for the past 20 years. The SoN's mission is to:

- advance and preserve knowledge about human health ecology, including human responses to health and illness of individuals, families, groups, and communities; environments which do and do not support health; and interventions to improve health;
- disseminate knowledge by educating the public and professionals through strategies that include and engage diverse learners; and
- provide service that promotes the health and well-being of diverse individuals, families, communities, populations, and systems.

The SoN mission statement focuses on research, practice, and teaching. For years, the research and teaching components of the mission have been achieved at the doctoral level through the PhD in Nursing Science program. The practice component of the mission was actualized at the master's level and now will be advanced through development of the practice-oriented Doctor of Nursing (DN) program. The DN program will focus on preparing graduates with competencies in clinical care, practice inquiry, and leadership, and will represent the highest level of academic preparation for nursing practice. In keeping with the SoN mission, DN graduates will have the skills to generate and disseminate knowledge to improve health outcomes, as well as provide expert clinical care to promote the health and well being of the public.

# IB. DOCUMENTATION OF NEED FOR PROGRAM

Nursing is a practice and academic discipline that constantly evolves in response to societal needs. For the past 40 years, advanced practice nurses (that is, nurse practitioners, clinical nurse specialists, nurse midwives, community health nurses, etc.) have become effective, indispensable providers of health care for patients of all ages. However, a transformation of advanced practice nursing is critical to meet the future challenges of increasingly complex care, changing patient demographics, and shifting health care delivery systems. The DN will prepare nurses as clinicians for advanced practice with patients, families, populations, and communities in health and illness with expanded leadership, research, and clinical skills. This degree will support the career trajectory for those pursuing expert clinical practice and leadership. Moreover, the DN will enhance nursing's ability to provide leadership in meeting the evolving needs of society.

# **IB1.** Changes in Health Care

# IB1a. Increasing Complexity of Illness Management Across the Age Span

The 21st century marks a shift from acute to chronic care in North America. Burgeoning scientific advances resulting in improved treatment and rehabilitation coupled with demographic changes result in increased numbers of patients with chronic conditions across the age continuum. The unparalleled aging of North America is dramatically changing health care. By 2030, those 65 years of age and older will comprise 20% of the population (National Center for Health Statistics, 2005). Those 85 years of age and older represent the fastest growing segment of the population. Advancing age is associated with an overall increase in chronic illness, especially heart disease, cancer, and diabetes. The incidence of chronic illness is also increasing at the young end of the age spectrum. Pediatric health care providers can expect that one out of every 10 patients will have a chronic, activity-limiting health condition (Callahan et al., 2001). Increasingly, these children are being cared for in outpatient settings and use many more health care services than their counterparts without chronic illness. In addition, mental illness is a significant cause of activity limitation among all age groups. Recent studies report that onequarter of all Americans 18 years and older met the criteria for having a mental illness within the past year with first onset usually in childhood or adolescence. Less than half of those in need receive treatment (Kessler et al., 2005).

Multiple services are needed to care for people with disabilities and chronic illness at any age. Successful care requires a sustained relationship with an expert provider who can work across disciplines, apply evidence to care, mobilize resources, and coordinate varied interventions for care. Nurse practitioners (NPs) are experts who provide competent, accessible, and cost-effective care in a wide variety of settings, as documented in a meta-analysis of 38 studies published in 1980-92 (Brown, 1993), in a review (Office of Technology Assessment, 1986), and in a study by Mundinger and Kane (2000). NPs also provide high-quality, cost-effective care to patients with more serious chronic health problems (Brooten et al., 1986; Daly, et al., 1991; Naylor, 1990; Campbell, 1993; Aiken et al., 1993; Naylor et al., 1994;). Clinical nurse specialists (CNSs) design innovative, evidence-based interventions; influence the practice of other nurses; and influence the acute care environment of the healthcare system to support autonomous nursing practice (National Association of Clinical Nurse Specialist, 2003). In addition, Brooten and her colleagues (2002), and Naylor and Brooten (1993) documented the cost savings and patient/family satisfaction of CNS interventions, such as in-home, post-hospital visits by CNSs to low birth weight infants and those with chronic illness.

Two additional, increasingly complex areas of health care are obstetrics and community care, including occupational health. Since 2002, Washington State has been identified by the American College of Obstetricians and Gynecologists (ACOG) as a "red alert" state, meaning that the availability of physicians to deliver obstetric care is at crisis level. As medical liability insurance costs continue to rise, experienced Ob-Gyn physicians are restricting their practices, relocating to other states, or retiring early (ACOG, 2004). Given the declining availability of obstetricians to deliver prenatal care in our state, especially to under-served populations, it is virtually mandatory for the UW SoN to continue to prepare certified nurse midwives (CNMs). A similar crisis exists in community health (Institute of Medicine, 2003). The need for increasingly effective public health systems is urgent as the public faces diverse health threats such as AIDS, bioterrorism, and an epidemic of obesity. In addition to these threats, health risks in occupational settings are staggering. On an average day, 17 people are killed on the job in the US

and another 170 die from job-related illnesses. Over 36,000 people suffer injuries each day at work. Annual costs of occupational related injuries, illness, and death in the U.S. are over \$150 billion (Association of Occupational and Environmental Clinics, 2005). The DN program will prepare nurse leaders to design prevention models, evaluate health outcomes, and manage health care needs of populations and communities.

In summary, doctoral education will prepare advanced practice nurses as leaders in each of these roles and more, assuring that complex care and fiscal challenges are met in our changing health care system.

**IB1b.** Diversity and Health Disparities: The rapid growth of multiple ethnic and culturally diverse populations presents additional challenges to the health care system. The Hispanic, Asian, and Pacific Islander populations have grown most rapidly. In 2002, 13% of the US population identified themselves as Hispanic (Health, US, 2004, 2000). Studies indicate that patients seen by advanced practice nurses are increasingly racially and culturally diverse, lack insurance, or are on Medicare and Medicaid. (Druss et al., 2003; Swartz, 2003)

Unfortunately, great health disparities exist between Caucasian and non-Caucasian groups in the US. For example, in 2001, infant mortality rates were highest for African Americans (13.5 deaths per 1000 live births), and Native Americans (9.7). Hispanic people have higher rates of tuberculosis and hypertension, and are twice as likely to die from diabetes than Caucasians. Overall mortality is 31% higher for African Americans than Caucasian Americans. Additionally, disparities in healthcare access exist between urban and rural/remote areas. The Washington State Department of Health considers potentially avoidable hospitalizations (PAHs) as a proxy measure for health care access. In 1999, there were more than 54,000 PAHs in Washington, accounting for 10% of Washington State hospitalizations. The greatest number of PAHs was from rural counties (i.e., Pacific, Wahkiakum, Skamania, Jefferson). In a Washington State Department of Health analysis, native Americans had particularly high PAH rates, attributed to their rural homelands; fragmented healthcare services; barriers related to culture, income, transportation; of rural/remote healthcare language and and lack providers (http://www.doh.wa.gov/HWS/default.htm).

The SoN has an established track record of preparing advanced practice nurses to provide care in rural settings (e.g., a HRSA-funded training grant for NPs; an in-review HRSA training grant to add specific training for CNSs; a funded HRSA Quentin-Burdick grant to support interdisciplinary health sciences students interested in rural practice.) In addition, faculty members from diverse backgrounds are being recruited in an effort to increase the School's sensitive and effective outreach to culturally diverse communities.

In summary, societal need and the changing health care system present renewed challenges to nursing. With these challenges comes the opportunity to increase nursing's capacity to lead and improve the health of the nation. Doctoral preparation providing enhanced clinical, leadership, and research skills will prepare graduates to recognize vulnerable populations, address the multiple causes of health disparities, and continue the momentum for culturally competent care by nurses.

# **IB2.** Evolution of Advanced Practice Nursing Education

The American Association of Colleges of Nursing (2004) identifies four advanced practice nursing roles as requiring transition from masters to doctoral level preparation: nurse practitioner (NP), clinical nurse specialist (CNS), certified nurse midwife (CNM), and nurse anesthetist. The first three roles (NP, CNS, CNM) will be included in the UW DN program as well as a focus on community health nursing. In 2003, the *U.S. News and World Report* again ranked the UW as a top school in many of its Master of Nursing (MN) focal areas, including NP, CNM, CNS, and Advanced Practice Community Health. This 2003 ranking is the most recent, as rankings are not determined annually. The UW has never offered a nurse anesthetist program, and therefore will not include this role in the DN program.

### **IB2a. Nurse Practitioners**

Nurse practitioner education in the U.S. began mainly as post-baccalaureate, non-degreed certificate preparation, based within health care institutions or academic settings. The UW SoN first offered master's level preparation for Pediatric and Family Nurse Practitioners in the early 1970s. In those early days of the NP movement, faculty and graduates from the UW played major roles in legislative as well as academic advances for NP practice in Washington as well as nationally (Draye & Brown, 2000). Over time national standards for core competencies have been developed along with certification and accreditation requirements for NP graduate education. Many of the faculty members from the UW, SoN continue to hold leadership positions in the standard setting organizations, such as the National Organization of Nurse Practitioner Faculties (NONPF) and American Association of Colleges of Nursing (AACN). An MN degree is now a requirement for eligibility for certification and licensure. Over time, NP curricula have expanded to meet demands of practice and certification.

### **IB2b.** Clinical Nurse Specialists

The role of the CNS was developed in the 1960s and 1970s and changed traditional nursing education from teaching, administration, or supervision to one of advanced practice specialization (National Advisory Council on Nurse Education and Practice, 1999). By the 1970s, the UW School of Nursing had masters focal areas preparing CNSs in medical-surgical nursing and many subspecialty areas (cardiovascular, respiratory; burn, trauma, and emergency; neuroscience), perinatal nursing, community health nursing, and psychiatric nursing. In 1982, the School was awarded a federal Advanced Nurse Training Grant (Woods & Underhill, 1982-1988) to enhance clinical mastery of cardiovascular CNSs. This groundwork still supports our current CNS students, who are prepared to sit for national CNS certification examinations (i.e., through American Nurses Credentialing Center, American Association of Critical Care Nurses, and Oncology Nursing Society). Unlike Oregon and California, Washington State does not offer advanced practice licensure or certification for CNSs.

# **IB2c.** Nurse Midwifery

Formal midwifery education in the US, based upon the European model, was introduced in the early 20th century by nurses to address the acute shortage of maternal and infant health care providers. Since that time, nurse-midwifery practice has been legally recognized in every state. There are approximately 43 nurse-midwifery education programs in the US, located primarily in Schools of Nursing but also in Schools of Public Health and Schools of Health Sciences. Midwifery education includes theory and clinical preparation that allows graduates who

demonstrate core competencies to provide primary health care to women and newborns. These core competencies are the basic requisites for graduates of all nurse-midwifery education programs accredited by the American College of Nurse-Midwives (ACNM) Division of Accreditation. The UW SoN developed its nurse-midwifery education program following passage of the 1998 Maternity Access Bill in order to train maternity care providers to meet the needs of the First Steps Program. Its first class enrolled in 1993. The program is fully accredited by the ACNM and has graduated a cohort annually since 1995. Midwifery graduates pass a national board examination to receive certification and are licensed to practice in the State of Washington as Advanced Registered Nurse Practitioners (ARNP).

# **IB2d.** Community Health Nursing

Graduate preparation in Community Health Nursing (CHN) at the UW was first provided at the generalist level in the 1960s and 1970s. By the late 1970s, it was conceived as Teaching and Leadership in Community Health Nursing. In the 1980s and subsequently, specialty tracks in Cross Cultural Nursing, Occupational Health Nursing, Transition Services, Teaching and Leadership, and Programmatic Intervention were offered. In 2002, the support of a HRSA training grant allowed the addition of new core courses to strengthen collaborative leadership, Community Based Participatory Research, cultural competence, social justice, and a well-designed distance program. Current community cognates are Communities for Youth, Healthy Aging, Cross Cultural Health, Occupational Health, and Rural Health. Therapeutic cognates are Program Development and Evaluation and Policy. As of 2004, the American Nursing Credentialing Center (ANCC) is exploring certification for Community Health/Public Health Nurses. The goal is to develop quality credentialing processes in the near future.

As can be seen in the examples above, over time, additional content areas have been needed to prepare advanced practice nurses to function capably in the evolving health care system. Consequently, specific foci within the Master of Nursing degree program require over twice the minimum number of credits required by the University for a masters degree (UW=36 credit minimum; UW SoN= up to 89 credits required for MN). This "credit creep" has grown to the extent that masters students in the SoN earn nearly the same number of credits as is required for a PhD in Nursing Science (UW PhD=90 credit minimum; SoN PhD= 99 credit minimum). In response to the SoN Practice Doctorate Task Force (PDTF) recommendation, the SoN graduate faculty voted in January, 2005 to develop the DN program.

# **IB3.** Changes in the Profession

Faced with fragmented and serious inadequacies in health care in the US, several organizations have called for substantial reform in educating the health care workforce of the future, including: the Institute of Medicine (Crossing the Quality Chasm, 2001), the Future of Family Medicine Project (2004), the PEW Commission (1991,1999), and the National Organization of Nurse Practitioner Faculties (NONPF, 2002, 2004). Recently, the American Association of Colleges of Nursing (AACN, 2004) passed a resolution recommending the practice doctorate as a paradigm shift in preparing advanced practice nurses. The AACN further recommended that by 2015, a practice doctorate (DN) be required for entry level advanced practice for nurse practitioners, clinical nurse specialists, nurse midwives, and nurse anesthetists. The UW SoN has a broad definition of nursing practice which encompasses not only care of individuals, but also care of

populations and communities. Thus, the DN program at the UW will embrace a full range of nursing practice roles at an advanced practice level.

# **IB4.** Changes in the Health Science Professions

The emerging trend for practice-oriented doctoral degrees is apparent in many health science professions at the University. Faculty members in the UW pharmacy and physical therapy programs recently received UW Graduate School approval to offer practice oriented doctoral programs in their disciplines. The DN will thus follow the trend in other health sciences professions, serving as a complement to their programs, allowing for the potential of shared courses and interdisciplinary exchange, and giving parity to nursing professionals who will share a common level of degree with graduates of programs in other health sciences schools.

# **IB5. Student Demand**

Demand for advanced practice education remains very high. Students in the NP focal areas of the MN program represent approximately 80% of MN students in the SoN. Our graduates can be found in Washington State, across the nation, and around the world. They deliver care in urban and rural areas with a strong focus on caring for the underserved. Many assume leadership positions in nursing or health care organizations and institutions. Graduates are also very successful at passing national certification boards. Despite their high level of education, however, all graduates have one opinion in common: they state that they need more clinical experience to "hit the ground running" in today's fast paced, complex health care system. Advanced coursework and the addition of a clinical residency in the DN program will be attractive to students and future employers.

Interest in the DN is increasing daily. Several faculty members have received inquiries about it from current and past students. Preliminary information on the DN program was posted on the SoN Web site on February 25, 2005. Since then, inquiries about the program average three requests per day via the Web plus 1-2 phone calls per day. Most requests are from Washington State, from nurses with 0-35 years of experience, indicating they want to start a program as early as 2006. In autumn, 2004 a session on the DN was presented at the annual Northwest Primary and Acute Care Continuing Education Conference in Seattle. Over 30 masters prepared, licensed nurse practitioners currently in practice attended this session and expressed much interest. Many wanted to leave their names for contact when more information became available. Furthermore, in a pilot survey of graduates of the FNP program, approximately 57% of respondents indicated an interest in the DN. A 2005 survey of Washington State RNs and employers of nurses has been distributed and data are pending related to DN interest.

### **IB6.** Workforce Needs

The nation and the State are in the midst of a nursing shortage that is expected to intensify as baby boomers age and the need for health care grows. This shortage is especially critical in leadership and advanced practice roles, including nursing faculty. While the PhD and masters programs are critical to meeting society's needs, demand grows for expert clinical leaders and clinical teachers. The number of doctorally prepared nurse educators is declining. Recent AACN national surveys indicate 50% of nurse faculty members hold doctorates; only 3% of advanced practice nurses hold doctorates. Nationally, the mean age of full time nurse faculty with doctorates is 53 years. Over 44% of UW SoN faculty members are within 10 years of retirement

age. The "graying" of the nursing profession is also reflected in the fact that the average age of working registered nurses is 43 years. The nurse population under the age of 30 years has dropped from 25% in 1980 to 9% in 2000 (HRSA, 2002). The average age of nurses in Washington State is 45 years. Fifty percent of the advanced practice nurse practitioners in Washington State are over the age of 50, and 25% are over the age of 55 years (Kaplan & Brown, 2004). The DN program will address these workforce needs by educating pre-master's students and master's prepared advanced practice nurses for roles as expert clinicians and educators.

# **IB7. Service to the Community**

The proposed DN program will continue and strengthen the relationship with sites that provide clinical experience for graduate nursing students. The School currently has affiliation agreements with 520 clinical sites, partners with 2029 preceptors, and has 585 clinical faculty appointments. In addition, the DN program represents the possibility of establishing exciting new partnerships with clinical sites for residency training and clinical investigation projects. Students in the DN program will have an additional academic year of clinical residency during which they will provide care to citizens of Washington State. Students will engage in therapeutic relationships with patients, families, and communities as part of this residency. It is anticipated they will be part of the clinical team, bringing current information to their clinical sites and preceptors. Through the doctoral clinical investigation (capstone) project, the opportunity exists to examine a clinical question of interest to the site as well as to the student. Examples of such collaboration might include study of outcomes for various clinic populations; development of strategies to increase access to services; integration of technology to support patient education. Faculty members in the SoN are actively involved in community service within the State of Washington and nationally. Many maintain active clinical practices within the community, serve on community boards, develop collaborative funding projects, and present educational offerings locally and nationally. Many serve in leadership positions within professional organizations at the state, national, and international level.

# IB8. Relationship to HECB Policies and Goals for Higher Education

The Higher Education Coordinating Board (HECB) has as its primary purposes the planning, coordination, monitoring, and policy analysis for higher education in the State of Washington. The proposed DN program is in keeping with the goal of protecting the public interest, insuring that new programs are needed and are a sound investment of state resources. As the eminent University in the State of Washington, the UW has responsibility to continue to offer superior nursing education for advanced practice. It is imperative and expected that the UW SoN will provide leadership by developing opportunities for nurses seeking advanced education to meet increasingly complex health needs of citizens of the State of Washington, country, and world. The proposed DN curriculum utilizes shared courses, collaborates across departments, builds on current strengths in the graduate curriculum, and focuses on efficiency in teaching strategies to maximize resources. As such, it is a sound use of state resources.

# IC. RELATIONSHIP TO OTHER INSTITUTIONS

### IC1. Duplication

Currently, there are no DN or practice-oriented doctoral programs in Nursing offered in the State of Washington or the WWAMIO (Washington, Wyoming, Alaska, Montana, Idaho, Oregon) region. It is our understanding that Washington State University is not contemplating offering such a degree, as they are focusing on the implementation of a PhD in Nursing program. Local private institutions that offer graduate nurse practitioner preparation (Seattle Pacific University, Pacific Lutheran University, Seattle University) are considering the nursing practice doctorate, but at this time, none have made a commitment to moving their master's programs to this level of education.

# IC2. Uniqueness of Program

Given the lack of advanced practice nursing programs at the doctoral level in our region, the proposed program is unrivaled. Nationally, the UW DN program offers a unique reformulation of the role of the advanced practice clinician, integrating advanced clinical practice, leadership, and practice inquiry. Of the few practice doctorate programs that exist, the proposed UW DN Program is the only program that spans the advanced practice spectrum from individual-focused care to practice with aggregate populations. No other nursing practice doctorate program currently exists that matches the breadth and depth of this proposed program.

#### II. PROGRAM DESCRIPTION

# IIA. Program Goals, Student Learning Objectives, End of Program Student Competencies

**Program Goals:** The overall goal of the DN program is to prepare registered nurses as clinicians for advanced nursing practice in health and illness, with expanded clinical inquiry and leadership knowledge and competencies. Instituting the DN provides the SoN an opportunity to respond to critical local, state, and national health care challenges. As doctorally prepared advanced practice nurses, graduates will be better able to address the increasingly complex health care needs of a diverse population, using evidence-based clinical guidelines, clinical inquiry investigative skills, and leadership competencies. These graduates will be prepared to address widening inequities in access to care and population health.

In order to assure that curricular design and methods maximize students' timely and satisfactory progression through the DN program of study, the following Program Goals will be implemented, monitored, and evaluated as defined in the Program and Student Learning Assessment (Section III). The DN program will:

- 1. build collaborative partnerships with community-based agencies, stakeholders and regulatory bodies to assure effective marketing strategies, involved participation in curricular design, and the creation of clinical practicum, residency and employment opportunities
- 2. expand opportunities for collaborative partnerships with UW schools/ colleges to jointly sponsor courses and clinical learning experiences
- 3. establish a governance structure to assure joint decision-making among faculty, students and administrators

- 4. assure that financial assistance and guidance are provided to DN students with particular emphasis on students with the highest financial need
- 5. provide and continuously evaluate the curriculum to assure quality, effectiveness and cultural sensitivity
- 6. assure that faculty enhance student learning through advisement, mentorship and role demonstration of DN competencies.

**Student Learning Objectives.** The student learning objectives for the DN program follow. The student will:

- 1. provide advanced nursing care to individuals, families, communities, and clinical populations.
- 2. create, manage, and evaluate innovative programs and practices of care for diverse populations.
- 3. enhance clinical investigative competencies to develop clinical science and approaches to public health.
- 4. appraise and utilize current technologies to advance the quality and accessibility of care.
- 5. critique and selectively translate science to guide clinical decision-making and program development.
- 6. evaluate and influence health care policy and systems.
- 7. provide leadership and inter-professional collaboration in multiple health care arenas.
- 8. improve quality and accessibility of care across diverse populations.

End of Program Student Competencies. Student objectives are operationally defined as end of program student competencies (identified in Table A). Student competencies are derived from the interface of each of the eight student learning objectives with each of the six curricular threads of critical thinking, practice inquiry, clinical management, interpersonal communication, inter-professional collaboration, and diversity awareness and application. In Table A, the student learning objectives are identified on the horizontal axis, the curricular threads are identified on the vertical axis, and the end of program student competencies are identified within the table at the interface between each student learning objective with each curricular thread.

# **Comparison of DN and PhD in Nursing Science Programs**

According to UW Graduate School Memorandum No. 6, there are two principal types of graduate degree programs: "practice-oriented" and "research-oriented:

- □ **Practice-oriented** graduate programs lead to a doctoral degree with emphasis on preparing graduates for professional practice at the frontiers of existing knowledge. Completion of the program is usually signified by the award of a Doctor Degree of a professional field, e.g., Doctor of Musical Arts, Doctor of Physical Therapy, etc.
- □ **Research-oriented** graduate programs lead to a doctoral degree with emphasis on preparing graduates to generate new knowledge through research or through the development of new modes of thought or expression. Completion of the program is usually signified by the award of a Doctor of Philosophy (PhD) degree.

The differentiation between the proposed "practice oriented" DN versus the "research oriented" PhD is consistent with Memorandum No.6 as evidenced by comparing goals and end of program objectives. The DN program is aimed at educating nurse clinicians who are primarily capable of advanced clinical practice that incorporates the dimensions of clinical leadership and practice inquiry. In contrast, the PhD program is aimed at educating nurse scientists who are primarily capable of independent research focused on the generation of new knowledge and theory building as it relates to nursing science and nursing practice. Objectives for students in the DN program (above, p. 10) are significantly different from the objectives for students in the PhD program (below):

- 1. generate knowledge that is inventive and rigorously tested within a selected area of nursing science;
- 2. have multiple perspectives of knowing and also acknowledge multidisciplinary contributions to knowledge generation;
- 3. be informed by social, cultural and political issues related to their area of scholarship;
- 4. test, generate, and extend knowledge relevant to nursing practice within a variety of clinical settings;
- 5. provide leadership in nursing as well as various professional and public groups.

The following table contrasts the PhD and DN domains of study. Although the credit load is similar, the emphases of the two programs are substantially different. Most PhD students already have a masters degree, whereas the DN students likely will enter with a baccalaureate degree.

PhD Domains	Doctor of Nursing Domains		
Theory and Domains of Nursing	Advanced Practice Nursing -50 cr		
Knowledge - 43 cr	Clinical Leadership -15 cr		
Research (includes dissertation) - 56 cr	Practice Inquiry (includes capstone clinical		
	investigation project) - 30 cr		
Total: 99 minimum credits	Total: 95 minimum credits		

TABLE A: STUDENT LEARNING OBJECTIVES AND CURRICULAR THREADS

THREAD	STUDENT LEARNING OBJECTIVE						
	1. Provide advanced nursing care to individuals, families and clinical populations.	<ul><li>2. Create, manage, and evaluate innovative programs and practices of care for diverse clinical populations.</li><li>3. Enhance clinical</li></ul>	4. Appraise and utilize current technologies to advance the quality and accessibility of care.	5. Critique and selectively translate science to guide clinical decision-making and program development.	6. Evaluate and influence health care policy and systems.	7. Provide leadership and inter-professional collaboration in multiple health care arenas.	8. Improve quality and accessibility of care across diverse populations.
		investigative competencies to develop clinical science and approaches to public health.					
Critical thinking	Evaluate, synthesize and apply complex multidisciplina ry knowledge to the delivery of individualized care, with a high level of independent and ethical judgment.	Evaluate and generate new approaches to care through critique of existing and emerging models and advanced knowledge of the needs of specific populations.	Evaluate and select appropriate technologies to support tracking clinical data and outcomes, coordinating care, and identification of trends.	Synthesize, evaluate and adapt empirical advances in clinical knowledge to provide care and develop standards to specific patients, populations.	Challenge ineffective health care policy that limits access or advancements in practice.	Critically appraise and generate strategies to resolve issues pertaining to delivery, quality and outcomes of health care.	Evaluate health related social disparities.  Propose and implement approaches to address identified inequities.

TABLE A: STUDENT LEARNING OBJECTIVES AND CURRICULAR THREADS, continued

THREAD	STUDENT LEARNING	STUDENT LEARNING OBJECTIVE						
	1.	2., 3.	4.	5.	6.	7.	8.	
Practice inquiry	In collaboration/ consultation w/ others, use caseload-tracking registries and "clinical epidemiological" methods to generate and interpret clinical data patterns.  In collaboration/ consultation w/ others, examine one's clinical practice setting for variation in health care effectiveness by examining mediating and moderating factors.  Critically apply and evaluate evidence based clinical guidelines to enhance quality and accountability in clinical patterns of care at one's clinical practice setting.	In collaboration/ consultation w/ others, develop and evaluate models and methods of disseminating and sustaining appropriate clinical guidelines in clinical practice.	In collaboration/ consultation w/ others, evaluate usefulness of technology to advance the quality, accessibility and cost of care.	In collaboration/ consultation w/ others, apply different designs, methods and analytic strategies to evaluate program implementation and effectiveness across diverse populations within one's practice setting.	In collaboration/ consultation w/ others, critique and evaluate how organizational, structural, financial and policy decisions impact cost, quality, and accessibility of health care at one's practice setting.  In collaboration/ consultation w/ others, test and evaluate new practice models for the 21 <sup>st</sup> century applicability to one's practice setting.	Evaluate effectiveness of personal leadership style.	In collaboration/ consultation w/ others, test strategies to understand and address variance within heath care services and outcomes that account for health disparity.	
Social Justice awareness and application	Analyze how one's own race/ethnicity, class, belief systems and values impact care delivery to diverse individuals, families, and clinical populations.  Develop and apply a process for assessing differing beliefs and preferences and take this diversity into account when planning and delivering care.	Integrate multicultural awareness and knowledge into health care practices and programs.	Apply technology to improve the health of racialized and/or vulnerable populations.	Evaluate clinical guidelines and other clinical evidence in relation to inclusiveness of diversity.	Analyze and articulate how issues of class, race, and gender create and maintain social hierarchies, health policies, and health care systems.	Apply a social justice framework to guide leadership efforts.	Challenge social, economic, cultural and political inequities as major determinants of health.	

TABLE A: STUDENT LEARNING OBJECTIVES AND CURRICULAR THREADS, continued

THREAD	STUDENT LEAF	RNING OBJECTIV	ES				
	1.	2.; 3.	4.	5.	6.	7.	8.
Clinical management	Provide comprehensive care that is patient centered, scientific, evidence based, socially just, using standards of care and ethical clinical judgment.  Provide health promotion and disease prevention across the health continuum, recognizing multiple influences on health.  Integrate principles of bio-psychosocial and behavioral health into the provision of care.	Design programs to meet the needs of clinical populations at risk for adverse outcomes due to current and historic, environmental, social and public policies.  Apply population level data to inform clinical decision making	Apply technology to increase access to care, and support critical thinking and clinical decision-making.	Skillfully use state of the art methods (electronic databases, systemic reviews and practice guidelines) to locate and synthesize best available evidence for health care decisions and program development.  Critically examine and incorporate heterogeneous evidence in one's clinical decision analyses that includes practice knowledge as well as differences within and across diverse populations.	Design and advocate for policy and system change to improve integrated, holistic care.  Eliminate barriers to professional practice.  Enhance opportunities for advancing the profession.	Advocate for access to quality, cost effective, prevention oriented health care.  Influence organizational decision-making to improve access and quality care.	Advocate for care/ services that address public health issues and social problems that affect health.

TABLE A: STUDENT LEARNING OBJECTIVES AND CURRICULAR THREADS, continued

	STUDENT LEARN	STUDENT LEARNING OBJECTIVE					
THREAD	1.	2., 3.	4.	5.	6.	7.	8.
Interpersonal communication	Effectively use a variety of interpersonal communication techniques and models as focal points of care.	Incorporate knowledge and principles about interpersonal communication in program development and evaluation.	Incorporate knowledge and principles of interpersonal communicatio n in the use of technologies in practice.	Provide effective written and oral communication regarding best practices and new clinical guidelines.	Apply interpersonal skills to enhance effectiveness in influencing policy and systems change.	Apply interpersonal skills for effective leadership across multiple arenas.	Apply interpersonal competencies that include the individual's perspective, cultural history, and socioeconomic context in all professional activities.
Interprofessional collaboration and leadership	Collaborate in building and maintaining a therapeutic team to provide optimum care.	Value Interprofessional contributions to programs and practices of care.	Apply technology to enhance Interprofessio nal collaboration.	Apply evidence from Interprofessional research to guide practice decisions.	Collaborate to improve health care delivery and systems of care.	Collaborate with interprofessional team to develop and evaluate innovative practice models.	Collaborate with coalitions to improve access to quality, affordable health care.

# IIB. CURRICULUM

# **IIB1.** Course of Study

The DN course of study will consist of revised and new graduate courses with an increased focus on evidence-based practice, leadership, and practice-focused scholarly inquiry. Some courses will be modified to take advantage of a variety of teaching strategies and educational technologies: educational modules, Web-based learning, problem-based learning, and interprofessional experiences. New courses will be added as requirements to enhance the focus on behavioral health, interpersonal relationships, research, health policy, and public health. An enhanced Learning Center will provide experience in clinical skill development: procedures, physical assessment, interviewing/counseling, clinical informatics, and laboratory skills. For program options focusing on care of individuals (vs. communities or aggregate populations), simulated patients will be used for both training and evaluation, utilizing the Observed Structured Clinical Exams (OSCE) currently being developed at the UW.

There will be multiple options for emphasis within the DN program, based on the current master's degree focal areas (NP, CNS, CNM, and advanced community health systems nursing). It is anticipated that there will be a period of transition in which these focal areas will continue to offer a master's exit point. During that time, all students (MN and DN) will complete the same core courses in their advanced practice specialty and in research. The DN student will complete additional courses in advanced practice, leadership, and inquiry. This approach will assure a cost-effective and efficient curriculum transition, with no duplication of teaching effort. Except for the Family Nurse Practitioner program (which will offer ONLY the DN degree beginning in 2007), each MN focal area will determine its transition to the DN based on student demand for the DN program, review of the program evaluation data, consideration of the legal/regulatory and community environment, and resources available. However, it is anticipated that by 2011 the DN degree will replace the MN degree for advanced practice in nursing.

<u>Degree Requirements</u>: The proposed degree will require a minimum of 95 graduate credits in the following distribution:

- •50 credits of advanced practice (theory and clinical practicum)
- •30 practice inquiry credits (research and a capstone investigation project)
- •15 credits of leadership, health systems, and policy content

The minimum credit distribution in advanced practice reflects the need to assure that graduates meet DN program competency expectations. In addition, the student will submit a portfolio of materials that provides evidence of attainment of student learning objectives and end of program competencies, including the successful completion of clinical progression exams. Although a dissertation will not be required, a clinical inquiry project referred to as the "capstone clinical investigation project" will be required. The focus of the project will be investigation of a clinical inquiry question related to clinical practice, the health care delivery system, or a health care policy issue. The project would interface closely with the student's residency placement by investigating a clinical inquiry question that is relevant to the student's interest and also relevant to the clinical agency sponsoring the residency. Thereby, the student collaborates with a team of

professionals and faculty investigating a dimension of clinical practice, health system, or policy that has immediate clinical utility and relevancy.

<u>Curricular Templates</u>. The DN curriculum templates for CNM and NP specialties offer greater depth in the areas of scientific underpinnings of practice, interpersonal communication, health promotion, the integration of complimentary medicine in advanced clinical practice, psychiatric/mental health care, chronic illness management, and "hands on" clinical practice experience (residency component). The CNS curricular template includes expanded content in scientific underpinnings, together with an enhanced practicum experience in the residency component. In moving from the master's preparation to doctoral level preparation, the advanced practice community health systems nursing curriculum has enriched the clinical curriculum in the areas of preventive health care, environmental/occupational health, public health informatics and surveillance, health systems, and a capstone community residency experience. All the DN program options have added series of courses in practice inquiry leadership/systems/policy. While the minimum number of required credits for the DN is 95, the appended proposed curricular examples require more than this minimum to assure that graduates meet requirements for national certification. Future curriculum examples may or may not require this greater number of credits. See example templates of the DN curriculum for selected program options in Appendix 1.

# **IIB2.** Admission Requirements

The DN application process will build on the current MN admissions process (see http://www.son.washington.edu/eo/mn\_admissions-info.asp), incorporating two additional criteria: an interview and a proctored essay. The interview will clarify the applicants' commitment to the expanded program and ask for their response to two clinical scenarios. The two-page essay will ask applicants to write about how they have responded to personal and professional challenges. These criteria will confirm the applicant's ability to think and communicate spontaneously, both verbally and in writing. Consideration will be given to the applicant's academic qualifications (grade point average, Graduate Record Examination, and other degrees), fit with the program (goals statement and past nursing experience), unique attributes (leadership and consultation roles, community service, overcoming personal hardships, cross cultural experience, teaching and research experiences, public speaking/presentations and publications), and experience with diverse populations.

### **IIB3.** Course Sharing

Within the SoN, the DN program will share courses with the MN (during the transition phase), MS, and PhD programs. Within the University, the DN program will share courses offered in other health sciences schools, such as Medicine, Public Health, Environmental Health, Public Affairs, Pharmacy, Health Services, etc. The DN will serve as a complement to other practice-oriented doctoral programs currently offered on our campus, and will allow for the potential of shared courses and interdisciplinary exchange among students who desire to attain a common level of degree.

### **IIC.** Use of Technology

Recognizing the critical role of information technology in education and clinical practice, the SoN has already invested in a number of innovative uses of technology in its curricula. In

addition, several goals in the SoN Strategic Plan include "...increase courses with distance and electronic support; enhance informatics and patient- centered technologies in the curriculum." Within this framework, it is anticipated that technology will play an integral role in the UW DN program by extending the use of technology beyond course delivery to training for use of technology in clinical practice and practice inquiry.

# **IIC1. Mode of Course Delivery**

Selected DN course content will be delivered through Web-based courses, a state of the art Learning Laboratory, and use of clinical informatics. Technology-enhanced distance learning, for example, Web-based, video-streamed courses, increases access for distant learners. Online courses can be set up in modules so students are able to set their own learning pace. Modular learning also promotes efficiency by allowing a number of students to move through the course at the same time. All students in the DN program will be expected to develop competencies in informatics and use of technology. For example, students will use electronic medical records and clinical logs (e-logs) that will allow generation of patient databases, document services delivered, track skill development, etc. In addition, students will use technology such as personal digital assistants (PDA) and the Internet to access sophisticated clinical decision support systems, thus incorporating current evidence in practice. The ability to apply advances in technology in order to improve health care outcomes will be a hallmark of the DN graduate.

Another example of the use of technology in the DN curriculum includes the use of a state of the art Learning Laboratory. Recently, the School received a \$350,000 gift from SpaceLabs Medical, Inc. that included eight specialized monitors for intensive care/cardiac care, labor and delivery, and neonatal care. The Learning Lab will provide opportunities for skill development in common procedures such as microscopic laboratory skills, x-ray film interpretation, hemodynamic monitoring, and the interviewing of standardized patients. Additionally, we have recently purchased a Sim Man (Laerdal) so that students can practice skills related to physical assessment (with normal as well as a variety of abnormal findings), procedures (e.g., CPR, hemodynamic monitoring, starting an intravenous line and administering pharmacological agents through that line), and monitoring vital signs (and watch the changes in response to the action of the specific pharmacological agents administered). Thus, the Learning Lab will provide the latest technology available to support students' clinical practice skills and decision making. The Learning Lab will be an especially efficient use of resources since numbers of students will be able to rotate through the lab at one time, avoiding duplication of teaching efforts. Faculty and staff will be present in the lab for observation, supervision and validation of student skills. additional external funding sources are being sought to provide for more lab equipment and the training/support of faculty and staff.

New information technologies have been shown to improve course design and delivery while decreasing costs and improving student learning (Twigg, 1999; Twigg, 2003). The School is investigating new instructional approaches that make efficient and effective student learning the central focus of a course rather than teaching. Doing this redesign allows us to offer core courses across focal areas of the DN program more effectively while controlling costs and enhancing quality indicators. By using innovative methods such as asynchronous, self-paced learning modes, students focus on problem solving and interactive learning rather than listening to lectures, transferring the locus of activity from the faculty to the student. This process entails

using technologies that assess student knowledge and provide instant feedback, and offering tutorials that allow students to assess and remediate deficiencies while collaborating with peers in learning communities. The DN program is an ideal target for course redesign, as it involves shared content across focal areas with the aim of improving student outcomes and controlling costs. Funding is being sought from a variety of intramural and extramural sources to enable such innovative course redesign.

# IIC2. Opportunities for Student/Faculty Interactions

The SoN 2005-2010 Strategic Plan reflects the commitment of the SoN to "...sustaining excellence in teaching, including distance and electronic learning." Strategies in the DN program to preserve vital student/ faculty interaction include face to face classroom time, on-line class discussion groups, email, and faculty review of data from student electronic clinical logs. Access to these electronic logs (e-logs) will help faculty evaluate clinical experiences and mutually plan for additional student learning needs, ensuring that students are exposed to diverse patients and varied clinical settings. In addition to using technology to enhance educational opportunity and interaction, in-person, face-to-face faculty/student contact continues to be an essential component of educational programs at the SoN. Faculty will continue to provide personal academic advisement, classroom teaching, supervision of the capstone investigation, and clinical coaching/mentoring in person.

# **IIC3. Faculty Development Activities**

The UW SoN faculty is fortunate to already have technological support from its Educational Outreach (EO) unit. It is expected that EO will continue to provide enhanced support and technology skills education to faculty as they develop web-based courses, distance learning opportunities, and Learning Lab activities. Several faculty members have exceptional skills in informatics and have been successful at securing federal funding for courses and development in this field for the SoN. Current activity as well as the proposed DN curriculum represents movement toward a pertinent goal in the SoN Strategic Plan to "...increase infrastructure to support faculty efforts in use of technology and electronic learning." In addition, the DN program will include evaluation of strategies to determine effectiveness of educational modalities including distance and electronic learning. In addition, faculty training in alternative teaching strategies, such as problem-based learning, and the use of computer assisted simulations for training and evaluation of clinical competence, will continue.

#### IID. Faculty

At the UW SoN, there are 22 research, 67 tenured/tenure-track, 6 without-tenure, and 585 clinical faculty members in the SoN. Of the tenure/tenure-track faculty, 32 hold the appointment of full professor, 21 are associate professors, and 14 are assistant professors. Almost 100 faculty members in the SoN have been designated by the UW Graduate School as members of the Graduate Faculty. Many faculty members are certified experts in specialties such as family practice, adult health, geriatrics, psychosocial/mental health, pediatrics, women's health, and acute/critical care; midwifery; policy development; and community health. Thirty-eight regular, emeritus, and clinical faculty members have been recognized for their contributions to nursing by induction into the American Academy of Nursing. Four faculty members are members of the Institute of Medicine.

Faculty members of the UW SoN have tripartite roles in research, education, and practice/service. Their excellence in these areas, as well as their commitment to meeting the varying educational needs of the students, allows the School not only to accomplish its mission and goals, but to maintain its position as the top-ranked SoN in the country. Faculty members qualified experience. roles education and both by http://ww.son.washington.edu/faculty/alphabetically.asp for a list of faculty, title, and academic qualifications/certifications. Faculty have obtained academic degrees from many different master's and doctoral programs, demonstrating a rich diversity of philosophies and thinking processes that are applied to the scholarship, curriculum, and service of the SoN. In addition to preparing nurses who are competent and caring, faculty are qualified to prepare specialists and scholars in clinical practice and research. The depth and breadth of faculty backgrounds position them uniquely to contribute to this new graduate program.

The SoN anticipates no increase in state funded faculty or staff FTEs to launch the DN program. The School will reallocate state funds and use summer quarter to fund the program. Additional resources will be required and will be obtained through extramural funding. Many faculty members teach in all degree programs at the School, and therefore, the percent effort of each individual teaching in the proposed DN program can only be estimated in Table 1 in Appendix 2. A formula of [four courses taught per academic year = 100% effort] has been used to complete the table and reflect their teaching and service responsibilities.

### **IIE. STUDENTS**

# **IIE1.** Projected enrollments for Seven Years

The SoN anticipates enrolling its first class into the DN program in Autumn Quarter, 2007. This first cohort of 30 students will consist of some pre-master's students, but will specifically target approximately 20 post-master's UW nursing faculty members and clinical preceptors who are experienced, advanced practice nurses and accomplished clinical instructors. The aim of preparing this select cohort of post-master's students with a DN degree is to enhance their skills to teach at the doctoral level. It is anticipated that these students will complete the program in approximately two years of part-time study, compared to the pre-master's students who will complete in 3 years. This cadre of advanced practice nurses will model the role of the doctorally prepared clinician in community agencies, clinical practices, and educational institutions. They also will provide valuable feedback to the SoN regarding the implementation of the DN curriculum.

The second cohort will again consist partially of post-master's UW nursing faculty members and selected UW nursing clinical preceptors. Approximately 45 new students are anticipated. The total number of students (headcount) in this second year of the program is 75.

For future years, enrollment will continue to increase in the DN as the SoN decreases enrollment in the Master of Nursing program. There will be a 7-year transition from the MN to the DN program. It is anticipated that the total number of graduate students in nursing (PhD, DN, MN, MS) will remain approximately the same during this time.

### **Table 2: Size of Program**

Year	# of Students Enrolled Full Time (FT) in DN Program (Headcount)	New FT Enrollments Year 01	Continuing FT DN Students Year 02	Continuing FT DN Students Year 03
2007	30	30	0	0
2008	75	45	30	0
2009	115	60	45	10*
2010	180	75	60	35*
2011	225	90	75	60
2012	255	90	90	75
2013**	270	90	90	90

<sup>\*</sup>Non-faculty/preceptor students. Faculty/preceptor portion of cohort will complete in Year 02. \*\*Year in which the program reaches full enrollment.

# **IIE2.** Expected time for program completion

The DN curriculum for full time students is 9-12 quarters (3 years), including three quarters of clinical residency. Students may also elect a part-time option, lengthening the program to 4 or more years, depending on the specialty area.

## **IIE3.** Diversity

The UW SoN uses a five-year plan (2004-2009) to recruit and retain a diverse student body based on our 10 year Strategic Plan (3 of the 7 goals of the SoN Strategic Plan relate to recruitment and retention of diverse faculty, students, and staff). Our recruitment and retention plan features five major goals, each of which enable us to more effectively recruit and retain diverse students in the DN program:

- Involve all School stakeholders in recruitment efforts while providing individualized follow-up to prospective students. Target outreach efforts to diverse students nationally, in the community, on campus, community colleges, middle and high schools. Streamline and demystify application forms, application review and financial aid processes. Implement an internet tracking system to individually contact diverse students who inquire about our programs.
- Use the SoN Website and databases as recruitment and retention tools to establish easier and more interactive access for prospective students. Develop a Multicultural Student Web page.
- Fortify relationships with professional nursing associations as a means of increasing numbers of diverse and qualified graduate applicants. We have partnered with several UW organizations aimed at inclusiveness, such as the Office of Minority Affairs, GO-MAP, Undergraduate Advising, UW Ambassadors, etc., and will use these partnerships to enhance recruitment of diverse students into the DN program.

- Actively build a SoN community that promotes diversity and effectively provides support
  services for diverse students. The SoN's Diversity Committee aims to promote
  inclusiveness and improve recruitment and retention efforts for the DN program. Offer
  pre-graduate school workshops focusing on skills to prepare for graduate school and
  submit competitive applications, skills that diverse applicants may not possess if they are
  the first in their family to attend graduate school, etc.
- Improve the climate of the SoN. The SoN was recently awarded a Diversity Appraisal Implementation grant aimed at ensuring that the climate at the SoN is diversity-friendly. Rewrite the SoN diversity statement to make explicit the need for representation of people no matter what their race, gender, class, disability, sexual identify/orientation (lesbian, bisexual, gay, transgender, queer, etc.), religion, age, ethnicity, culture, region/geography, indigenous status, learning needs, families, etc. Redesign the SoN climate statement to include Hurtaldo's four dimensions of climate (institutional context [historical legacy of inclusion/exclusion], structural, psychological, and behavioral dimensions) that can be specifically targeted for improvement.
- Develop funding as a recruitment tool for diverse students. The SoN offers workshops, brown bags, and panel discussions for students on obtaining financial aid. We have been awarded a loan forgiveness program that decreases school loan balances substantially for each year a PhD or DN graduate teaches in a school of nursing. New and substantial scholarship funding for students will be available beginning in 2008. The SoN also has numerous scholarships targeted at recruitment and retention of diverse students.

#### **IIF.** Administration

Staff duties in the School of Nursing are not delineated by degree program. Rather, staff are cross-trained and work in a team structure aimed at specific, large initiatives that cross degree programs.

TABLE 3: ADMINSTRATIVE/SUPPORT STAFF

Unit	Name	Title	Responsibilities	Effort in Program (2007, 30 DN students)	Effort in Program (2013, 270 DN students)
ing	Gaylene Altman	Director, Learning Lab	learning lab coordination	10%	20%
Learning Lab	Academic Student Employee	Teaching Assistant	provide instruction to students in SoN Learning Lab	20%	40%
Office of Nursing Research	Marty Lentz & Bob Burr	Methods Consultants	methodology support & coaching	25%	30%
mic ses	Shi-Chi Chung	Evaluation Research Assistant	evaluation research assistant	10%	25%
Academic Services	New	Program Coordinator	program coordination & support	100%	100%
	Dagmar Schmidt	Director of	coordinates student	10%	25%

		Student	support services		
		Services			
	Ann Klingensmith	Director of Operations	manages budgets and operations	10%	25%
	Pat Conyers	Program Coordinator	facilitates admissions	10%	25%
	Kathleen Jennings	Nursing Student Counselor	offers therapeutic counseling	10%	25%
	Erica Winberry	Program Coordinator	maintains files, supports faculty coordinating committee	10%	25%
	Jenn Hixson	Program Coordinator	supports clinical placements	10%	25%
	Indrani de Saram	Program Coordinator	establishes affiliation agreements with clinical sites	10%	25%
	Carolyn Chow	Director of Admissions & Multicultural Student Affairs	leads recruitment and admissions	10%	25%
	Julie Katz	Assistant Dean	facilitate program accreditation	10%	25%
	Mary Rivard	Program Coordinator	manages time schedule and course planning	10%	25%
	Maria Tong	Program Coordinator	develops and provides degree program information	10%	25%
	Stephanie Kirschner	Database Developer	develops systems for student data	10%	10%
	Kevin Ruggles	Data Engineer	designs systems for student data	10%	10%
	Alan Gojdics	Web Curriculum & Multimedia Manager	enables learning technology	10%	40%
ach	Richard Dandridge	Media Development Coordinator	facilitates video conferencing	10%	40%
al Outre	Aubrey Hale	Web Manager	creates and maintains course Web sites/student information	10%	40%
Educational Outreach	David Hughes	Information & Software Architect	builds networked systems and programs for teaching	10%	40%
田田	Melinda McRae	Web Information Specialist	supports faculty in developing course Web sites	10%	40%
	Penny Vielma	Manager	supports budget and operations of distance learning services	10%	40%
	Lory Watkins	Media	facilitates video	10%	40%

		Developer	conferencing		
РСН	New	Program Coordinator	program coordination	50%	75%
PC	New	Site Coordinator	site coordination	25%	50%
FCN	New	Program Coordinator	program coordination	50%	75%
FC	New	Site Coordinator	site coordination	25%	50%
BNHS	New	Program Coordinator	program coordination	50%	75%
BN	New	Site Coordinator	site coordination	25%	50%
TOTAL				5.55%	11.15%
FTE					
STAFF					

# III. PROGRAM AND STUDENT LEARNING ASSESSMENT

The SoN has a wealth of experience in developing and implementing curricular assessment plans, including the obtainment of additional grant resources to support the implementation of assessment plans. The DN proposed assessment plan draws on this experience, plus many of the SoN general and specific training grants' assessment forms will be modified to capture the DN program goals and specific student learning objectives. The assessment model incorporates elements from Utilization-Focused Evaluation approach (Patton, 1997), the UW Provost's Committee on Accountability Report (1997) and the Pew Health Professions Commission Report (1995). The assessment model entails several critical evaluation elements and principles:

- Evaluation is an **ongoing process** that provides data collected over multiple time points to support continuous review and modification of the newly offered DN program. The duality of process (during program) and outcome (post-program) assessment data is typically referred to as formative and summative evaluations.
- Evaluation encompasses **multiple perspectives** including students, faculty, clinical preceptors, future employers, and stakeholders.
- Evaluation encompasses **multiple methods** of data collection including questionnaires, interviews and observations that yield a convergent approach to data interpretation. The multiple methods will yield both *quantitative* and *qualitative* anecdotal type data that enhance an understanding of the phenomena evaluated (advance practice, clinical inquiry and leadership enhancement). For example, students before, during and after their program of study are asked to *quantify* their sense of mastery of each of the DN competencies by completing a questionnaire Likert scale on competency performance. Student individual progress as well as group patterns can be evaluated across time (preprogram baseline/ during program/post program). In addition, students/ graduates are also asked to *qualitatively* describe exemplars of their mastery of DN competencies and how they have contributed to improvements in health care delivery systems and health outcomes.
- Evaluation entails both **short-term and long-term measures of post-graduation outcomes**. Short-term measures refer to goals attainable immediately upon graduation (e.g. percentage of students who successfully complete a capstone project/graduated, employed, etc.). Long-term

measures of accountability are "external impact measures" of the program's longitudinal effects 1,3 & 5 years post graduation (e.g. graduates' contribution to the field of nursing/impact on health care delivery systems and health outcomes). Common themes will be identified in response to open-ended questions about advanced practice, clinical inquiry and leadership. From previous experience, faculty have found that the challenging task of documenting long term outcomes with respect to "external impact measures" is best addressed using questionnaires coupled with phone interviews. Faculty members have found phone interviews a valuable method to expand and clarify the graduate's responses on questionnaires. In addition, past training program evaluation data suggest that years 1, 3 & 5 capture the longitudinal trajectory of professional development and contribution to the field of health care.

# IIIA. Program Assessment Plan

The overall program evaluation question focuses on the extent that the curricular design and methods maximizes student timely and satisfactory progression through their program of study. Program characteristics that assure students engage in meaningful and effective learning experiences encompass a variety of factors such as partnerships with community- based clinical agencies, preceptors and stakeholders; faculty/ student shared governance structure; student financial resources; student advisement support and mentorship; dedicated and qualified faculty; state of the art pedagogic ways of teaching; and interdisciplinary shared learning experiences through courses, clinical practica, projects, and simulated laboratory learning. A detailed Program assessment plan is found in Table B below.

# **TABLE B: Program Assessment Plan**

## **Evaluation Questions:**

- Has the DN Program established community- based partnerships with Agencies and Stakeholders?
- Has the DN Program established interdisciplinary partnerships with UW schools and colleges?
- Has a formal faculty, student administrative shared governance structure been established?
- Is financial assistance available to students who have financial need?
- Is the overall curriculum rated as quality and effective on a variety of dimensions?
- Do faculty members provide useful advisement and exemplary mentorship?

EVALUATION FOCUS	MEASUREMENT INDICES	DATA SOURCE	TIME POINT
Collaborative	Community participation in	Advisory Board Meeting Reports	Annually
Partnership Building	licensure regulations, program	Clinical Faculty Meeting Reports	Annually
with Community- based	marketing, curricular	SoN/ UW clinical contracts with	Quarterly
Agencies, Stakeholders	development/evaluation, and	community agencies for clinical	
& Regulatory Bodies	creation of clinical practicum/	practica and residency	
	residency and employment	placements	
	opportunities for graduates.		
Collaboration	Jointly shared courses	Number jointly offered courses/	Annually
Partnership Building	Interdisciplinary shared learning	non-nursing courses	
with UW schools/	experiences	Number / type interdisciplinary	Annually
colleges		experiences	
Faculty/ Student/	SoN governance bylaws establish	Doctor of Nursing Coordinating	Annually
Administrative Shared	DN Coordinating Committee to	Committee minutes/ reports	
Governance	oversee program.		
Financial Guidance &	Number student support services	Faculty/Students advisement	Quarterly
Assistance	accessed	report	
	Number tuition/stipend/TAs/RA	Student Financial report	Annually

	Number traineeships/ fellowships		
Curriculum Quality, Effectiveness & Cultural Sensitivity	Coursework/ learning lab quality and cultural sensitivity of learning experiences	Student Evaluation: UW educational assessment forms Faculty self-evaluation: UW	Quarterly  Quarterly
		Instructional Resources	Quarterry
		Faculty Peer Evaluation: SoN Peer Instructional Form	Annually
	Clinical practicum & leadership quality and cultural sensitivity of learning experiences	Student/ Faculty / Clinical Preceptor Evaluation of Clinical Practicum/ Leadership Experience Form	Quarterly
	Capstone Clinical Investigative Project quality of learning experience	Student/ Faculty / Community – based Committee Evaluation of Capstone Project Experience Form	During Project
	Final Evaluation of Program Curriculum Quality and Effectiveness	Student End of Program Evaluation Form	Graduation
Faculty Advisement / Mentorship	Faculty enhancement of student learning through advisement & mentorship	Faculty Activity Form Number student publications, presentations, etc.	Annually

#### **IIIB. Student Assessment Plan**

**Student Profile (Pre-Program Assessment Plan)**: As a new program, it is imperative that pre-program data are collected to enhance understanding about the type of applicants that gravitate toward selecting the more challenging practice-oriented doctorate degree rather than a master's degree in nursing. Important questions to ask are: Who are these students? Why did they desire to obtain DN degrees? Do students come to the program exhibiting the type of characteristics that are predictive of successful mastery of the DN advanced practice, clinical inquiry and leadership knowledge and competencies? Does the Program attract a diverse student body? In addition, are students committed to providing health care to underserved populations as defined by the federal government? A detailed Student Pre-Program Assessment Plan is found in Table C.

# **TABLE C: Student Learning Outcome Assessment Plan: Pre-Program Student Profile** Evaluation Questions:

- Why do students choose the DN program?
- Does the program recruit diverse students?
- Are students committed to providing health care to "underserved" populations as defined by the federal government?
- Do students come to the program exhibiting those characteristics predictive of successful completion of DN program competencies?

EVALUATION	MEASUREMENT INDICES	DATA SOURCE
Focus		
Reasons for	Identified Reasons	Admission Committee Report & Pre
<b>Selecting Doctor of</b>	(e.g. clinical knowledge/ competency	Program Student Profile Questionnaire
<b>Nursing Program</b>	enhancement, employment advancement, parity	

	with other disciplines etc.)	
Recruitment	Number students represent diversity as defined	Admission Committee Report & Pre-
Diverse Students	by race/ethnicity, SES, gender, age, sexual	Program Student Profile Questionnaire
	identity/ orientation, religion, culture, indigenous	
	status, life experiences, disability, region/	
	geography, past professional/academic/leadership	
	experiences	
Student	Number of students whose previous professional	Admission Committee Report,
<b>Commitment to</b>	employment provided health care to "underserved	& Student Resume
Underserved	populations".	
Populations		
	Number of students who expressed intentions to	Pre-Program Student Profile Questionnaire
	provide health care to underserved populations	
	upon graduation.	
Potential for	Entry Level Current & Potential DN	Admission Criteria/ Interview, Resume &
Successful	Competencies	Self-evaluation of DN
Graduation		Competency Scale

Student Learning and Performance (During Program Assessment Plan): Student retention and progression through their Program of Study will be addressed through traditional indices such as exams, grades, clinical safety/ competency ratings and completion of the capstone clinical investigation project. In addition, students will develop a Portfolio as a way to design, integrate and monitor a program of study that assures the mastery of each of the eight student learning objectives interface with each of the six curricular threads (see Table in Section II B1). The Portfolio will be discussed on a quarterly basis with faculty advisors. Electronic log data on clinical experiences are complied over time. Throughout the student's graduate study program, evaluative feedback will be obtained and compared across perspectives as shared by student, faculty, and clinical preceptors. A detailed Student During Program Assessment Plan is found in Table D below.

# TABLE D: Student Learning Outcome Assessment Plan: During Program Student Learning and Performance

### **Evaluation Questions:**

- Do students access SoN support services and receive financial aid?
- Why do students drop out of the program?
- Do students progress in their program of study in a timely, satisfactory and meaningful way?

EVALUATION	MEASUREMENT INDICES	DATA SOURCE	TIME
Focus			POINT
Student	Profile of Students Who Drop Out of Program	Student Exit Interview	Point of
Retention	Reasons for Dropping Out of Program		Exit
Student	Student Completion of learning activities	Program of Study Spreadsheet &	Quarterly
Satisfactory	designed to meet each of the eight Program	Student Portfolio:	
Progression	Objectives interface w/ each of the six	Student w/ Advisor plan and	
	Curricular threads	document satisfactory completion of	
		learning activities (courses, learning	
		lab simulated learning activities,	
		projects, clinical practica &	
		exams/grades)	
	Student's self-evaluation of overall program	Student Self-evaluation DN	Annually
	progress	Competency Scale	
	Faculty evaluation of student progress	Faculty Meeting Review of Student	Quarterly
		Progression	Yr 01 &

	Progression Clinical Exam	02
Community- based Clinical Preceptor	Community- based Clinical Preceptor	During
evaluation of student progress in advanced	Evaluation of Student DN	clinical
practice, clinical inquiry & leadership	Competencies.	practicum
knowledge & skills		
	Student Self-evaluation of DN	
	Competencies Progress	
	Faculty Site Visit Evaluation of	
	Student Progress	
Student Progression on Capstone Clinical	Student Supervisory Committee	During
Investigation Project	jointly evaluate progress	project

Graduate Achievements: (Post-Program Assessment Plan). The ultimate evaluation goal is to document how graduates contribute to the improvement of health care delivery systems and health outcomes. Basic outcome questions will be asked, for example, do students graduate in a timely manner, and if so, do they obtain national certification and employment? However, with the increased emphasis on advanced practice, clinical inquiry and leadership, additional outcome questions need to be addressed. Do graduates create new employment roles within the health care system that allow for the expression of their advanced practice, clinical inquiry and leadership knowledge and competencies? Are graduates providing health care to underserved populations? And ultimately, are graduates making a difference in the health care delivery system and health outcomes for the citizens of Washington and beyond? A detailed Graduate Post-Program Assessment Plan is found in Table E below.

# TABLE E: Student Learning Outcome Assessment Plan: Post-Program Graduate Achievements

## **Evaluation Questions:**

- Do students graduate in a timely manner?
- Do graduates obtain national professional certification in specialty areas?
- What types/location of employment do graduates obtain?
- Do graduates create new roles within the health care system?
- Do graduates obtain employment that allows for the expression of their advance practice, clinical inquiry and leadership knowledge and competencies?
- Do graduates contribute to the improvement of health care for citizens, families and communities of Washington State and beyond?

• Are graduates providing health care to underserved populations?

EVALUATION	MEASUREMENT INDICES	DATA SOURCE	TIME POINT
Focus			
Student	Percentage of Students Who	Student Graduation Committee Report	End
<b>Graduation Rate</b>	Graduate		Program
	Length of Program		
National	Percentage of graduates who obtain	Graduate Profile Questionnaire:	End Program/
Certification	certification	Certification type questions	Annual FU
	Types of certification obtained		
Employment	Employment position encompasses	Graduate Profile Questionnaire:	End Program/
Profile &	advanced practice, clinical inquiry	Employment type questions	Annual FU
Commitment to	and leadership type responsibilities.	(e.g. type position, type of agency, type	
Underserved	Employment position encompasses	of populations served, types of	
Populations	providing health care to underserved	responsibilities, etc.)	
_	populations.		

Leadership Actualization	Number and type of leadership contributions at the local, state, regional, national & international level	Graduate Resume, Self-evaluation Leadership Competency Scale & Graduate Profile Questionnaire:	End Program/ Annual FU
		Leadership type questions (e.g. publications, conference presentations, demonstration projects, quality assurance system reviews, etc.)	
Care System and	Graduate employment and professional activities contribute to the improvement in the delivery of health care and improved health outcomes.	Graduate Descriptive Profile Questionnaire & Phone Interview: (describe examples whereby your advance practice, clinical inquiry and leadership activities contributed to impacting health care system & health outcomes.  Employer/ Colleague Questionnaire (describe examples whereby graduate's employment responsibilities contributed	1,3,5 yr FU
		to impacting health care system & health outcomes.	

# IV. FINANCES

# **IVA.** Summary of Program Costs

There will be a gradual increase in costs between Year 1 and Year 7 as enrollment increases from 30 to 270 students.

TABLE 4: SUMMARY OF PROGRAM COSTS – YEAR 1 (2007) AND YEAR 7 (2013)

Line Item	Internal Reallocation	New State Funds	Other Sources	Year 1 Total	Year 7 Total
Administrative Salaries (01-70)	State Funds	0	N/A	\$ 123,480 33,463	\$ 314,791 85,308
(# FTE) Benefits @ 27.1				\$ 156,943 2.05 FTE	\$ 400,099 5.35 FTE
Faculty Salaries (01-10_ (# FTE) Benefits @ 23.2	State Funds	0	N/A	\$ 371,071 86,088 \$ 457,159 5.51 FTE	\$ 3,001,890 700,041 \$ 3,701,931 41.35 FTE
TA/RA Salaries (01-40) (# FTE) Benefits @ 13.4	State Funds	0	N/A	\$ 10,680 1,431 \$ 12,111 0.30 FTE	\$ 23,136 3,100 \$ 26,236 0.65 FTE
Clerical Salaries (01-60) (# FTE) Benefits @ 30.8	State Funds	0	N/A	\$ 108,828 33,519 \$ 142,347 3.2 FTE	\$ 174,624 53,784 \$ 228,408 5.15 FTE
Other Salaries (c) (# FTE) Benefits @ # %	N/A		N/A		
Contract	N/A				

Services				
Goods &	N/A			
Services				
Travel	N/A			
Equipment	N/A			
Other (itemize)	N/A			
Indirect (if				
applied to	N/A			
program)				
TOTAL COST			\$ 768,560	\$ 4,356,674
FTE Students				270
Cost-per-FTE			\$ 25,619	\$ 16,136
Student			·	,

# V. EXTERNAL EVALUATION OF PROPOSAL

# A. External Expert Reviewers

External reviewers of this proposal are being included in the UW SoN's 10-Year Graduate School Review, to occur in November, 2005. Both external and internal reviewers will thus have the opportunity to comment on the proposal, giving the School, the University, and the HEC Board rich feedback. Reviewers who have been asked to serve so far are:

#### **Internal Reviewers:**

Gunnar Almgren (confirmed)
Associate Professor, UW School of Social Work
Faculty Associate, Center for Studies in Demography & Ecology

Mark Guthrie Associate Professor, Rehabilitation Medicine Head, Division of Physical Therapy

### **External reviewers:**

Donna Hathaway Professor and Dean The University of Tennessee Health Science Center College of Nursing

Carol Hogue Associate Professor Emeritus University of North Carolina, Chapel Hill

Ada Sue Hinshaw (confirmed) Professor and Dean University of Michigan

# **B.** Other Public Four-Year Institutions

When the HEC Board reviews this proposal, the UW SoN will invite comment from the Washington State University (WSU)/Intercollegiate Center for Nursing Education (ICNE). WSU/ICNE is the only other public four-year institution in the State of Washington.

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